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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/891,717	06/26/2001	Hideo Sakai	JP920000104US1 (590.056)	1831
35195	7590	09/21/2004	EXAMINER	
FERENCE & ASSOCIATES 400 BROAD STREET PITTSBURGH, PA 15143			VO, HUYEN X	
			ART UNIT	PAPER NUMBER

2655

DATE MAILED: 09/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/891,717	SAKAI, HIDEO	
	Examiner	Art Unit	
	Huyen Vo	2655	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 26 June 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-7 and 9-18 is/are rejected.
- 7) ☒ Claim(s) 8 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 26 June 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>3/13/02 & 11/5/03</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Allowable Subject Matter

1. Claim 8 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The combination of Matsumoto and Kiraly et al. discloses that the service provider generates voice synthesis data based on the voice characteristic data of the speaker selected by the customer and loads the obtained voice synthesis data into the device of the customer (*see claim 4 below*). The combination of Matsumoto and Kiraly et al. fails to disclose that the service provider furnishes the customer, together with the list of the speakers, a list of devices into which the voice synthesis data can be loaded; whereby the customer notifies the service provider, via the network, which device was selected from the list. Furthermore, it would have not been obvious to one of ordinary skill in the art at the time of invention to incorporate the method mentioned above to realize the claimed invention.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

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3. Claim 12-13 are rejected under 35 U.S.C. 102(e) as being anticipated by Matsumoto (US Patent No. 5950163).

4. Regarding claim 12, Matsumoto discloses a storage device, on which a computer readable program is stored, that permits the computer to perform: a process for accepting a request from a remote user to generate voice synthesis data (*figure 2*); a process for, in accordance with the request, generating and outputting a transaction number (*col. 8, ln. 29-67 or referring to figure 7, the schedule information*); and a process for, upon the receipt of the transaction number, outputting voice synthesis data that are consonant with the request (*col. 8, ln. 29-67 or referring to figure 7*).

5. Regarding claim 13, Matsumoto further discloses that the program permits the computer to further perform a process, which attaches, to the voice synthesis data, verification data for verifying the contents of the voice synthesis data (*col. 7, ln. 19 to col. 8, ln. 28*).

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

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7. Claims 1-4, 7, 9, and 14-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Matsumoto (US Patent No. 5950163) in view of Kiraly et al. (US Patent No. 6324511).

8. Regarding claim 1, Matsumoto discloses a voice synthesis system established between a customer and a service provider via a network comprising:

a terminal of the customer used by the customer to designate text data for which voice synthesis is to be performed (*figure 2*);

a server of the service provider which employs voice characteristic data to perform voice synthesis using the text data that is specified by the customer at the terminal to generate voice synthesis data (*figure 2*).

Matsumoto fails to disclose a terminal of the customer used by the customer to select a specific speaker from among speakers who are available for the customer's selection. However, Kiraly et al. teach a terminal of the customer used by the customer to select a specific speaker from among speakers who are available for the customer's selection (*col. 13, ln. 1-32 or referring to figure 5B*).

Since Matsumoto and Kiraly et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to modify Matsumoto by incorporating the teaching of Kiraly et al. in order to satisfy user's taste and preference.

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9. Regarding claim 9, Matsumoto discloses a server, which performs voice synthesis in accordance with a request received from a customer connected across a network, comprising:

a request acceptance unit which accepts, via the network, a request from the customer that includes text data input by the customer (*figure 2*); and

a voice synthesis data generator which, in accordance with the request received from the customer by the request acceptance unit, performs voice synthesis of the text data based on the voice characteristic data that are stored in the voice characteristic data storage unit (*referring to figure 2*).

Matsumoto fails to disclose a voice characteristic data storage unit, which stores voice characteristic data obtained by analyzing voices of speakers, and receiving a request from the customer that includes a speaker selected by the customer. However, Kiraly et al. teach a voice characteristic data storage unit, which stores voice characteristic data obtained by analyzing voices of speakers (*col. 13, ln. 1-40, memory 106-108 are used to hold software programs and characteristics of speaker's voice*), and receiving a request from the customer that includes a speaker selected by the customer (*col.13, ln. 1-40*).

Since Matsumoto and Kiraly et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to modify Matsumoto by incorporating the teaching of Kiraly et al. in order to satisfy user's taste and preference.

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10. Regarding claim 14, Matsumoto discloses a storage medium, on which a computer readable program is stored, that permits the computer to perform:

a process for accepting, for voice synthesis, a request from a remote user that includes text data (*figure 2, text data are sent to the server for TTS conversion services*); and

a process for, in accordance with the request, employing voice characteristic data to perform the voice synthesis for the text data (*figure 2*).

Matsumoto fails to disclose that the request from a remote user includes a speaker selected by the remote user. However, Kiraly et al. teach that the request from a remote user includes a speaker selected by the remote user (*col. 13, ln. 1-32 or referring to figure 5B*).

Since Matsumoto and Kiraly et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to modify Matsumoto by incorporating the teaching of Kiraly et al. in order to satisfy user's taste and preference.

11. Regarding claim 15, Matsumoto discloses a program transmission apparatus comprising:

a storage device which stores a program permitting a computer to perform (*figure 8 depicts 2 computing systems, which includes memory for storing instructions for processing the signal*);

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a second processor which outputs, to the customer, voice synthesis data that are obtained by employing voice characteristic data selected from the list by the customer to perform voice synthesis using text data entered by the customer (*col. 7, ln. 14-67*); and

a transmitter which reads the program from the storage device and transmits the program (*col. 8, ln. 38-67, schedule is regarded as the program*).

Matsumoto fails to disclose a first processor, which outputs, to a customer, a list of multiple sets of voice characteristic data stored in the computer. However, Kiraly et al. teach a first processor, which outputs, to a customer, a list of multiple sets of voice characteristic data stored in the computer (*104 in figure 1 and col. 13, ln. 1-11*).

Since Matsumoto and Kiraly et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to modify Matsumoto by incorporating the teaching of Kiraly et al. in order to satisfy user's taste and preference.

12. Regarding claims 16-17, Matsumoto discloses a voice synthesis data storage medium and a voice output device, on which, when a customer connected via a network to a service provider submits text data to the service provider, and when the service provider generates voice synthesis data in accordance with the text data submitted by the customer, the voice synthesis data are stored (*col. 20, ln. 31-67*). Matsumoto fails to disclose that the customer selects a speaker for use in the voice synthesis. However, Kiraly et al. teach that the customer selects a speaker for use in the voice synthesis (*col. 13, ln. 1-11*).

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Since Matsumoto and Kiraly et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to modify Matsumoto by incorporating the teaching of Kiraly et al. in order to satisfy user's taste and preference.

13. Regarding claims 4 and 18, Matsumoto discloses a voice synthesis method and a program storage device readable by machine, employed via a network between a service provider, who maintains voice characteristic data for multiple speakers, and a customer, said method and program comprising the steps of:

the customer transmitting to the service provider, via the network, a text data for which voice synthesis is to be performed (*figure 2*); and the service provider employing the voice characteristic data for the speaker selected by the customer to perform the voice synthesis using the text data (*figure 2*).

Matsumoto fails to disclose that the service provider furnishing a list of the multiple speakers via the network to a remote user; and the customer transmits to the service provider an identity of a speaker that has been selected from the list. However, Kiraly et al. teach that the service provider furnishing a list of the multiple speakers via the network to a remote user (*col. 13, ln. 1-11, the list of speaker are present to the user for selection*), and the customer transmits to the service provider an identity of a speaker that has been selected from the list (*col. 13, ln. 1-11*).

Since Matsumoto and Kiraly et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at

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the time of invention to modify Matsumoto by incorporating the teaching of Kiraly et al. in order to satisfy user's taste and preference.

14. Regarding claims 2-3, Matsumoto further discloses that the server of the service provider transmits the obtained voice synthesis data to the terminal of the customer across the network (*Referring to figure 2*), and the server of the service provider assigns a transaction number to the customer; and wherein, when the number is presented by the terminal of the customer, the server transmits the voice synthesis data to the terminal of the customer (*col. 21, ln. 5 to col. 22, ln. 18*).

15. Regarding claim 7, Matsumoto further discloses that the service provider transmits the voice synthesis data to the customer; and whereby the customer loads the voice synthesis data into a device that reproduces a voice based on the voice synthesis data (*figure 2*).

16. Claims 5 and 10-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Matsumoto (US Patent No. 5950163) in view of Kiraly et al. (US Patent No. 6324511), as applied in claim 4 above, and further in view of Ladd et al. (US Patent No. 6269336).

17. Regarding claims 5, Matsumoto, as applied in claim 4, discloses a text-to-speech synthesizer for converting text to speech (*figure 2*), but fails to disclose that the service

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provider assesses a charge for voice synthesis data produced using the voice synthesis, and transmits the voice synthesis data to the customer upon receipt from the customer of payment for the charge. However, Ladd et al. teach that the service provider assesses a charge for voice synthesis data produced using the voice synthesis, and transmits the voice synthesis data to the customer upon receipt from the customer of payment for the charge (*col. 37, ln. 35 to col. 38, ln. 16*).

Since the modified Matsumoto and Ladd et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Matsumoto by incorporating the teaching of Ladd et al. in order to collect money for services provided.

18. Regarding claim 10, the modified Matsumoto, as applied in claim 9, does not disclose that the voice characteristic data storage unit stores for each speaker, as the voice characteristic data, voice quality data and prosody data. However, Ladd et al. teach that the voice characteristic data storage unit stores for each speaker, as the voice characteristic data, voice quality data and prosody data (*col. 6, ln. 25-36*).

Since the modified Matsumoto and Ladd et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Matsumoto by incorporating the teaching of Ladd et al. in order to provide dialog with different personalities to satisfy user's taste and preference.

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19. Regarding claim 11, Matsumoto, as applied in claim 9, fails to disclose that a price setting unit, which sets a price for the voice synthesis data based on the request issued by the customer. However, Ladd et al. teach that a price setting unit, which sets a price for the voice synthesis data based on the request issued by the customer (*col. 37, ln. 38 to col. 16*).

Since the modified Matsumoto and Ladd et al. are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Matsumoto by incorporating the teaching of Ladd et al. in order to correctly collect money for services provided.

20. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Matsumoto (US Patent No. 5950163) in view of Kiraly et al. (US Patent No. 6324511), as applied in claim 4 above, and further in view of Shell (US Patent No. 6134533).

21. Regarding claim 6, the modified Matsumoto, as applied in claim 4, does not disclose that the service provider pays a fee that is consonant with the generation of the voice synthesis data to a person who owns all rights to the voice characteristic data that the service provider holds. However, Shell teaches that the service provider pays a fee that is consonant with the generation of the voice synthesis data to a person who owns all rights to the voice characteristic data that the service provider holds (*col. 2, ln. 55 to col. 3, ln. 67*).

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Since the modified Matsumoto and Shell are analogous art because they are from the same field of endeavors, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Matsumoto by incorporating the teaching of Shell in order to enable developers to receive payments for the use of their product by others.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Huyen Vo whose telephone number is 703-305-8665. The examiner can normally be reached on M-F, 9-5:30.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Doris To can be reached on 703-305-4827. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Examiner Huyen X. Vo



July 19, 2004


SUSAN MCFADDEN
PRIMARY EXAMINER